

REMARKS

This responds to the Office Action mailed on January 22, 2007. Claims 1, 5-6, 11-13, 16, 18-19, 22, 26, 28-29, 41, and 44-45 are amended, claim 43 is canceled, and no claims are added; as a result, claims 1-29, 41-42, and 44-46 are now pending in this application.

Claim Objections

Claim 44 was objected to due to a typographical error. Applicant has amended claim 44 to overcome this objection.

Affirmation of Election

As provisionally elected by Applicant's representative, **David C. Peterson**, on 1/10/2007, Applicant elects to prosecute claims 1, 2, 5, 7, 9-12, 14, 16-18, 20, 22-25, 41-44, and 46. Claims 3, 4, 8, 13, 15, 19, 21, 26-29, and 45 were agreed as withdrawn from consideration pending allowability of a generic claim.

Double Patenting Rejection

Claims 1, 5, 11, 12, 16, 18 and 41 were provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1, 12, 17 and 18 of copending Application No. 11/458,863. Applicant will consider filing a terminal disclaimer to obviate double patenting rejections once claims are found to otherwise be allowable over cited art.

§102 Rejection of the Claims

Claims 1, 2, 5, 7, 9-12, 14, 16-18, 20, 22-24, 41, 42 and 46 were rejected under 35 U.S.C. § 102(b) as being anticipated by Jackson et al. (U.S. Patent No. 5,013,366). Applicant respectfully submits that the claims as amended are distinguishable over Jackson for at least the following reasons.

The rejection states that Jackson teaches "cleaning contaminated substrate (col.7, lines 3-5) comprising suspending substrate in a liquid suspension medium (reads on "a carrier fluid" as

claimed), such as deionized water.” However, Jackson does not show a carrier fluid including a halogenated hydrocarbon fluid in an amount sufficient to immerse the semiconductor surface.

In contrast, independent claims 1, 11, 16, 22, and 41 as amended include a carrier fluid including a halogenated hydrocarbon fluid in an amount sufficient to immerse the semiconductor surface.

Because Jackson does not show every element of Applicant’s independent claims, a 35 USC §102(b) rejection is not supported. Reconsideration and withdrawal of the rejection are respectfully requested with respect to Applicant’s independent claims 1, 11, 16, 22, and 41. Additionally, reconsideration and withdrawal of the rejection are respectfully requested with respect to the remaining claims at least as depending from allowable base claims.

§103 Rejection of the Claims

Claim 25 was rejected under 35 U.S.C. § 103(a) as being unpatentable over Jackson et al. (U.S. Patent No. 5,013,366). Applicant respectfully submits that for at least the reasons outlined above under 35 USC §102(b), claim 25 is also not obvious over the single reference Jackson. Reconsideration and withdrawal of the rejection are respectfully requested.

Claims 43 and 44 were rejected under 35 U.S.C. § 103(a) as being unpatentable over Jackson et al. (U.S. Patent No. 5,013,366) in view of Tipton et al. (U.S. Patent No. 6,800,142). Applicant respectfully submits that the claims as amended are distinguishable over Jackson and Tipton for at least the following reasons.

The rejection states that “Jackson does not specifically indicate the use of halogenated hydrocarbon fluid and particularly a chlorocarbon solvent as a suspension medium.” The rejection further states that “Tipton teaches a process wherein removal of photoresist residues is enhanced by using a chlorocarbon solvent in combination with the densified fluid (col. 4, lines 25-31).”

Tipton appears to recite small amounts of additives of 0-15% by weight with listed additives being acetonitrile, ethanol, methanol, isopropanol, tetrahydrofuran, methylene chloride, chloroform, 1,2-dichloroethane, diethyl ether, hexane, toluene, benzene, xylene, tertiary butyl methyl ether, 1,4-dioxane, 1,2-diethoxyethane, 1,2-dimethoxyethane, ethylene glycol, propylene

glycol, ethyl lactate, acetic acid, trifluoroacetic acid, dimethylacetimide, N-methylpyrrolidinone, dimethyl formamide, dimethyl ethanolamine. However, Applicant is unable to find in Tipton any reference to additive in amounts sufficient to immerse a semiconductor surface. As taught in Applicant's specification, such amounts of carrier fluid permit gas bubble formation to enhance cleaning.

In contrast, independent claim 41, from which claims 43 and 44 depend, includes a carrier fluid including a halogenated hydrocarbon fluid in an amount sufficient to immerse the semiconductor surface. Applicant respectfully submits that no motivation, teaching, or suggestion is found in Jackson and Tipton for a halogenated hydrocarbon fluid as claimed.

Because the cited references, either alone or in combination, do not show every element of Applicant's independent claims, a 35 USC §103(a) rejection is not supported by the references. Reconsideration and withdrawal of the rejection are respectfully requested with respect to claims 43 and 44.

CONCLUSION

Applicant respectfully submits that the claims are in condition for allowance, and notification to that effect is earnestly requested. The Examiner is invited to telephone Applicant's attorney at (612) 373-6944 to facilitate prosecution of this application.

If necessary, please charge any additional fees or credit overpayment to Deposit Account No. 19-0743.

Reservation of Rights

In the interest of clarity and brevity, Applicant may not have addressed every assertion made in the Office Action. Applicant's silence regarding any such assertion does not constitute any admission or acquiescence. Applicant reserves all rights not exercised in connection with this response, such as the right to challenge or rebut any tacit or explicit characterization of any reference or of any of the present claims, the right to challenge or rebut any asserted factual or legal basis of any of the rejections, the right to swear behind any cited reference such as provided under 37 C.F.R. § 1.131 or otherwise, or the right to assert co-ownership of any cited reference. Applicant does not admit that any of the cited references or any other references of record are

relevant to the present claims, or that they constitute prior art. To the extent that any rejection or assertion is based upon the Examiner's personal knowledge, rather than any objective evidence of record as manifested by a cited prior art reference, Applicant timely objects to such reliance on Official Notice, and reserves all rights to request that the Examiner provide a reference or affidavit in support of such assertion, as required by MPEP § 2144.03. Applicant reserves all rights to pursue any cancelled claims in a subsequent patent application claiming the benefit of priority of the present patent application, and to request rejoinder of any withdrawn claim, as required by MPEP § 821.04.

Respectfully submitted,

PAUL A. FARRAR

By his Representatives,

SCHWEGMAN, LUNDBERG, WOESSNER & KLUTH, P.A.
P.O. Box 2938
Minneapolis, MN 55402
(612) 373-6944

Date 4-23-07

By


David C. Peterson
Reg. No. 47,857

CERTIFICATE UNDER 37 CFR 1.8: The undersigned hereby certifies that this correspondence is being deposited with the United States Postal Service with sufficient postage as first class mail, in an envelope addressed to: MS Amendment, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on this 23 day of April 2007.

Lisa Peterson

Name

Lisa Peterson

Signature